

The sum of these investigations is this: that one plant of *Erica cinerea* which it has been impossible to trace to human agency appeared in Nantucket forty years ago and lived till 1902 or 1903; that there are two of the same species of doubtful origin now alive near the spot where the first was found; that the Lawrence Coffin *Calluna*, now dead, in all probability adds one more locality for this as a wild plant to those previously known in New England and the British provinces; that the *Calluna* of the nursery came in from Europe with the imported trees; that every other bit of it on the island goes back to that for its origin, or else has come from the Kimball, Dahlgren or Starbuck seed, and that the cross-leaved heather, *Erica tetralix*, stays under the pines and larches where it was first found.

BROOKLYN, N. Y.

ADDITIONAL LISTS OF CONNECTICUT DIATOMS.

WILLIAM A. TERRY.

DURING the past year I sent to Tempère at his request some fifty different gatherings of North American diatoms. He was about to issue the second edition of the "Diatomées du monde entier"¹ and I was pleased at the opportunity of bringing these collections to the notice of the scientific world, especially as many of them contained new species that I had discovered. Among these gatherings was one from "Doer's Mountain Grove" Ice pond, on a small mountain brook near New Britain reservoir. This was notable as containing abundance of *Surirella Terryi* Ward. This *Surirella* was the principal form in Spring's Pond, a small pond on the north bank of the Pequaback River in Bristol, and with it were numbers of the small *S. ovalis* var. *angusta* (Kütz.) V. H. A quarter mile down the river just east of Saw Shop is a pond hole on the Lee property formed by cutting off a bend of the river when the highway was moved to accommodate the railroad; this is also rich in *S. Terryi*. Below this

¹ Diatomées du monde entier. Collection Tempère et Peragallo. Deuxième Édition. 1907-1908.

is Downs' Pond, a large part of which is a cove setting back from the river, in which the mud is three or four feet deep, all very rich in diatoms, including abundance of the species in question, which is abundant also in Thompson's Pond, on the headwaters of a small brook flowing into Downs' Pond, and Allen's Pond in Stafford district, near the northeast corner of Bristol, on the headwaters of a small stream, and Beattie's Pond, at Leete's Island. At this last station are also other rare species, including *Navicula peripunctata* Brun, *Pleurosigma simile* Grun., and the very rare *P. subsalinum* Per. Outside these ponds above noted I have never found more than an occasional specimen of *S. Terryi* in all the hundreds of gatherings by myself and others from streams, ponds, lakes and rivers all over the country. Of the seven ponds in which this species is found, four are on the headwaters of streams many miles apart, but all in Connecticut, while the others are on the Pequaback River.

The following lists from the third and fourth fascicles of the *Diatomées du monde entier* are from my material and are interesting as being the latest and most authoritative determinations; many species here given were not in my list¹ and some of them have never before been credited to North America. In spelling, abbreviations and italics, the original is followed; the explanation as there given is — "Nota. Le nom des espèces prédominantes sont imprimés en caractère gras; les rares en italique et les autres en caractère courant."

The Fall Mountain gathering was from a small brook flowing from a mountain spring; Bunnell's Pond is the highest in a series of ponds on a stream flowing from South Mountain reservoir.

No. 78. ICE POND, NEW BRITAIN, (CONNECTICUT, U. S. A.).

Achnanthes coarctata Grun.	Encyonema lunatum Grun.
Amphora libyca Ehr.	Epithemia argus v. amphicephala Grun.
<i>ovalis</i> Ktz.	<i>gibba</i> Ktz.
<i>pediculus</i> Ehr.	v. <i>ventricosa</i> Ktz.
Cymbella amphicephala Naeg.	<i>zebra</i> v. <i>proboscida</i> Grun.
<i>Ehrenbergii</i> Ktz.	Eunotia <i>diodon</i> Eh. <i>fa. minor</i> .
<i>gastroides</i> Ktz.	<i>impressa</i> Grun.
<i>naviculaeformis</i> Auers.	

¹ RHODORA, Vol. IX, p. 125.

- Eunotia lunaris* Grun.
major Rab.
 v. ventricosa Cl.
monodon Eh.
pectinalis Rab.
 v. ventricosa Grun.
praerupta v. bidens Grun.
ternaria Eh.
- Fragilaria virescens* Ralfs.
- Gomphonema acuminatum* Eh.
 dichotomum W. Sm.
 intricatum Ktz.
 montanum Shum.
 montanum v. suecica
 Grun.
- Hantzschia amphioxys* Grun.
 elongata Grun.
- Meridion constrictum* Ralfs.
- Navicula acrosphaeria* Bréb.
 affinis Ktz.
 amphirynchus Eh.
 bicapitata v. hybrida
 Grun.
 Braunii Grun.
 v. interrupta.
 Breissonii Ktz.
 cryptocephala Ktz.
 cuspidata Ktz.
 dubia Greg.
 gigas Ehr.
 iridis Eh.
 limosa Ktz.
 v. subundulata.
 major Ktz.
- Navicula mesogongyla v. interrup-*
ta Cl.
mesolepta v. stauronei-
formis Gr.
mesotyla Eh. var.
nobilis Ktz.
nodosa v. curta Rab.
pupula v. lineare v. n.
 avec la striation de
 N. pupula et la forme
 bacillaire à extrémités
 arrondies M. P.
trinodis Lewis.
 var.
viridis Ktz.
 v. commutata Grun.
- Nitzschia sigmoidea* W. Sm.
- Stauroneis anceps* Eh.
 v. linearis Eh.
 gracilis Eh.
 legumen Ktz. La forme
 représentée dans V.
 H. Syn. 4/11 n'en est
 qu'une variété très
 étroite.
- Surirella saxonica* Auersw.
 splendida Eh.
 tenera v. splendidula A.S.
 Terryi Ward n. sp.
- Synedra capitata* Eh.
 ulna Eh.
- Van Heurckia rhomboides v. am-*
phipleuroides Grun.

Nos. 103, 104. FALL MOUNTAIN, BRISTOL, CONNECTICUT no. 1
 (Etats-Unis).

(Sources et ruisseaux à 800 pieds d'altitude).

- Achnanthes lanceolata* Bréb.
 v. Haynaldii?
- Cymbella gastroides* Ktz.
- Diatoma anceps v. capitata* M. Per.
 à extrémités resserrées
 et fortement capitées.

- Diatoma anceps* v. *linearis* M. Per.
très étroite, lineaire à extrémités atténuées.
hyemale fa *curta*.
var. *mesodon* Grun.
- Encyonema ventricosum* Grun.
- Eunotia arcus* Eh. v. *minor* V. H.
v. *tenella* Grun.
minor Rab.
pectinalis v. *stricta* Rab.
- Fragilaria aequalis* v. *producta* Lag.
- Gomphonema angustatum* Ktz.
angustatum v. *elongata* M. Per. plus long que le type, biconique à extrémités à peine un peu produites. Longueur 60 μ .
angustatum v. *producta* P. P.
dichotomum W. Sm.
micropus Ktz.
tenellum Ktz.
- Hantzschia amphioxys* Grun.
fa *major* Grun.
vivax v. *granulata* M. Per. très grand, porte à une certaine distance de la carène une ligne de points analogues aux points caréniaux. Longueur 250 μ . 13 stries en 10 μ .
- Meridion constrictum* fa *elongata*, très long et étroit.
constrictum v. *Zinkenii* Grun.
- Navicula acrosphaeria* v. *minor* M. Per. et F. H.
appendiculata Ktz.
- Navicula bisulcata* Lag.
Bogotensis v. *ininterrupta* M. P. à striation non interrompue au milieu de la valve.
Bogotensis v. *undulata* M. Per. diffère de A. S. 44/30 par les bords triondulés.
Cari Eh. v. *angusta* Grun.
decurrens Eh.
dicephala Eh.
dicephala v. *lata* M. Per. largement elliptique, rostrée, capitée et striation du *Nav. dicephala*.
divergens W. Sm.
elegantissima M. Per. Petite, largement elliptique à extrémités rostrées, capitées; structure formée de granules fines disposées en élégantes lignes courtes décussées comme chez les *Orhoneis*.
elliptica Ktz.
fasciata Lag.
gibba Ktz.
hemiptera Ktz.
heroina A. S.
major Ktz.
parva Eh.
Smithii v. *dilatata* M. Per. fortement dilatée, presque circulaire; aire centrale développée, côtes fines et isolées, peu distinctement granulées.
stomatophora Grun.
subcapitata v. *stauroneiformis*.

- Navicula viridis* Ktz. extrémités relativement plus larges et plus capitées. Long 22 μ largeur 7 μ .
- v. commutata* Grun.
- v. fallax* Cl.
- Pleurosigma attenuatum* W. Sm.
- Stauroneis anceps* Eh. *Synedra ulna* Eh.
- v. linearis.* *v. vitraea* V. H.
- anceps v. capitata* M. *Tabellaria fenestrata* Ktz.
- Per. Semblable à la variété *amphicephala* mais plus petit, à bords droits et à *flocculosa* Ktz.
- v. ventricosa* Grun.
- Van Heurckia vulgaris* Thw.
- No. 105, 106. BUNNEL'S POND, BRISTOL, CONNECTICUT (Etats-Unis)
(Dépôt fossile d'eau douce).
- Amphora Lybica* Eh. *Eunotia gracilis v. nodosa?* les extrémités sont rondes, différentes de celles de *E. formica*.
- pediculus* Grun.
- Cocconeis placentula* Eh. *incisa* Greg.
- v. lineata* V. H. *lunaris* Grun.
- Cymbella cuspitata* Ktz. *monodon* Eh.
- Ehrenbergii v. minor* V. H. *pectinalis v. ventricosa* Grun.
- gastroides* Ktz. *praerupta* Eh.
- heteropleura* Ktz. *robusta v. tetraodon* V. H.
- producta* M. Per. De forme elliptique, à extrémités productes, semblable à celle figurée dans A. S. atlas 9/52 mais plus grande à aire centrale plus développée et stries distinctement divisées en travers. Long 74 μ ; 7 stries dorsales, 8, 5 ventrales en 10 μ .
- Encyonema ventricosum* Ktz. *Fragilaria Harrisonii* Grun.
- Epithemia turgida* Ktz. *virescens* Ralfs.
- Zebra* Ktz. *Gomphonema acuminatum* Eh.
- Eunotia arcus* Eh. *angustatum* Ktz.
- v. plicata* J. B. et F. H. *augur* Eh.
- diodon* Eh. *commutatum* Grun.
- fa. minor* Grun. *constrictum v. capitata* Eh.
- formica* Eh. *Herculaneum* Eh.
- micropus* Ktz.
- Mastogloia Smithii* Thw. var. *Meridion constrictum* Ralfs.
- Navicula acrosphaeria* Ktz. *acrosphaeria* var. *dilatata* M. Per. à centre très

- fortement dilaté en forme de cercle et à extrémités capitées.
 affinis v. amphirynchus Eh.
- Navicula affinis fa. maxima.
 americana v. bacillaris M. P. et F. H.
 amphigomphus Eh.
 bisulcata Lag.
 Bogotensis Grun. var.
 brevicostata Eh.
 commutata Grun.
 dactylus fa. curta Ktz.
Dariana A. S.
 divergens W. Sm.
 divergens v. bacillaris M. Per. tout à fait bacillaire à extrémités exactement hémicirculaires.
 divergens v. constricta M. Per. à partie ventrale resserrée et à extrémités atténuées arrondies.
 elegantissima M. Per.
 fasciata Lag.
gentilis Donk.
 gibba Eh.
Hitchcockii Eh.
 iridis Eh.
 legumen Eh.
 limosa Ktz.
 linearis Greg.
 major Ktz.
 mesolepta v. stauroneiformis Grun.
mesostyla Ktz.
 nobilis Eh.
 rhyncocephala Ktz.
rupestris Hantz.
transversa A. S.
 viridis Ktz.
- Navicula sp. A. S. atlas 44/44.
 sp. A. S. atlas 49/40. (N. producta v. acuta.)
 Nitzschia spectabilis Ralfs.
 Stauroneis acuta W. Sm.
 v. gracilis Eh.
 gracilis Eh.
 lanceolata Ktz.
Phoenicenteron Eh.
 Pteroidea Eh.
 Stephanodiscus astraea Grun.
 Surirella **Guatemalensis** Eh. = Sm. Cardinalis Kitt.
 Kittoni? A. S. v. elliptica.
 linearis W. Sm.
 v. constricta Grun.
pseudo cruciata M. Per., de structure tout à fait semblable à celle de A. S. 56/15, 16 mais ne présentant pas le renforcement de la partie centrale.
 splendida Eh.
 tenera Greg.
 v. nervosa A. S.
 v. splendidula A. S.
 valida A. S.
- Synedra splendens Ktz.
 ulna Eh.
 v. lanceolata fa brevis Grun.
 v. undulata Greg.
- Tabellaria fenestrata Ktz.
 flocculosa Ktz.
 flocculosa v. ventricosa Grun.
- Van Heurckia rhomboides Bréb.
 rhomboides v. amphipleuroides Grun.
 vulgaris Thw.